

(REFERENCE COPY - Not for submission)

FCC Form 399: Reimbursement Request

Facility 43170 Service: DTV Call WMAE-TV Channel:

ID: Sign: 9 (High VHF) File 0000026661

Number:

FRN: **0001739002** Date **05/14**

Submitted: /2020

Applicant Information

Applicant Name, Type, and Contact Information

Applicant	Address	Phone	Email	Applicant Type
MISSISSIPPI AUTHORITY FOR EDUCATIONAL TV Doing Business As: MISSISSIPPI AUTHORITY FOR EDUCATIONAL TV	Greg Wells 3825 RIDGEWOOD ROAD JACKSON, MS 39211 United States	+1 (601) 432- 6197	Greg. Wells@mpbonline. org	Government Entity

Reimbursement Contact Name and Information

Contact Information

Applicant Address Phone Email

[Confidential]

Preparer Contact Information

Preparer Contact Name and Information

Applicant	Address	Phone	Email
Robert Gehman ConsultingEngineer Kessler and Gehman Associates, Inc.	Robert Gehman 507 NW 60 Street Suite D Gainesville, FL 32607 United States	+1 (352) 332-3157	bob@kesslerandgehman. com

Broadcaster Information and Transition Plan

Question	Response
Will the station be sharing equipment with another broadcast television station or stations (e.g., a shared antenna, co-location on a tower, use of the same transmitter room, multiple transmitters feeding a combiner, etc.)? If yes, enter the facility ID's of the other stations and click 'prefill' to download those stations' licensing information.	No
Briefly describe transition plan	Replace transmitter using existing antenna and line.

Transmitters

Section	Question	Response
Transmitter Related Expenses	Do you have transmitter related expenses?	Yes

Primary Transmitter

Existing Transmitter Information

Section	Question	Response
Existing Transmitter Description	Type of change	Purchase New
	Use	Primary (Main)
	Description of Use	N/A
	Ownership	Owned
	Owner	N/A
	Site	N/A
	Is this transmitter currently shared with another station?	No
	Is this transmitter currently in operating condition?	Yes
Existing Transmitter Manufacturer and Type	Manufacturer	
	Model	PLATINUM PTCD10P1
	Year	2007
	Туре	Solid State
	Solid State Cooling	Air Cooled
	Solid State Power Capacity	2.2 kW

Primary Transmitter

New Transmitter Costs

Section	Question	Response
New Transmitter	Use	Primary (Main)
	Change Type	Purchase New
	Is this a request for upgraded equipment?	No
	Manufacturer	
	Model	TBD
	Transmitter Type	Solid State
	Solid State Cooling	Air Cooled
	Solid State Power capacity	2.2 kW
	Justification for New Transmitter	The manufacturer of the existing transmitter advises that the transmitter cannot be retuned to the assigned channel. See attachment.

Primary Transmitter

Other Transmitter Costs

Section	Question	Response
Electrical Service	Service Entrance (3 phases 800A 208V)	No
	Switchgear (industrial 800 amp)	No
	Transformer (480V)	Yes
	Power	150 kVA
	Rigid Conduit and Wiring	No

	Size	N/A
	Length	N/A
	Other Electrical Service	No
	Description	N/A
HVAC Service	Does the replacement transmitter require HVAC Service?	No
	Туре	N/A
	Size	N/A
	Other Size	N/A
Transmitter Building Addition/Modification or Leasehold Improvement	Does the Transmitter Building require an addition, modification, other leashold improvement?	No
	Size	N/A
Channel 14 Costs	Is an RF Consulting Engineer needed?	N/A
	Is a channel 14 Mask Filer needed?	N/A
	Is additional field engineering time needed?	N/A
	Number of Days	N/A

Primary Transmitter

Other Transmitter Cost Not Listed

Name	Description
Standby Exciter and Switch	Standby Exciter with Automatic Change Over Switch
Electrical	Electrical
Additional Interior RF System	Interior RF System Existing Transmitter to Interim Transmission line

Antennas

Section	Question	Response
Antenna Related Expenses	Do you have antenna related expenses?	Yes

Primary Antenna

Existing Antenna Information

Section	Question	Response
Existing Antenna Description	Type of change	Retune Existing
	Antenna Use	Primary (Main)
	Description of Use	N/A
	Ownership	Owned
	Owner	N/A
	Site	N/A
	Is the existing antenna shared with another station or stations?	No
	Is the existing antenna directional?	No
	Is antenna in operating condition?	Yes
	Is antenna located on or in close proximity to an antenna farm?	No
Existing Antenna	Class	Full Power
Manufacturer and Type	Mounting	Top Mount
	Antenna position in stack	Not in Stac
	Polarization	Horizontal
	Туре	Other
	Number of Stations Supported	N/A
	Number of Panels	N/A
	Design power capacity in use	N/A
	Lower Limit	N/A

Upper Limit	N/A
Other Antenna Type	Batwing
ERP: (Effective Radiated Power)	31.0 kW
Manufacturer	Dielectric
Model	TAB-12H
Year	1990

Primary Antenna

Adjustment to Existing Antenna

Section	Question	Response
Sweep Test of Existing Antenna	Do you need a sweep test of existing antenna?	Yes

Primary Antenna

Other Antenna Costs

Section	Question	Response
Combiner for Shared Antenna	Do you need a Combiner for a Shared Antenna?	No
	Туре	
	Number of channels supported	N/A
	Frequencies of channels supported	N/A
	Frequency	

Primary Antenna

Other Antenna Cost Not Listed

Name	Description
Rigging	Rigging to replace elbow complex which was found to be mismatched

Transmission	Section	Question	Response
Line	Transmission Line Related Expenses	Do you have transmission line related expenses?	No

Tower
Equipment
And
Rigging
Costs

Section	Question	Response
Tower Equipment or Rigging Costs Changes	Do you have tower equipment or rigging costs changes?	No

Outside Professional Services Costs

	Section	Question	Response
al	Outside Project Management Services	Do you require outside project management services?	Yes
		Number of Hours	204
		Explanation	Fewer Project Management "PM" tasks are required & Other Engineering Services "OES" are required, therefore the PM total has been reduced to 20 hrs (\$3,000 at \$150/hr), & a new OES category has been created & funded with the money removed from PM.
	Outside RF consulting Engineering Services	Perform engineering study for new channel assignment and antenna development	Yes

Prepare engineering section of Form FCC Construction Permit Application	Yes
For Auxiliary Facility	No
For Main Facility	Yes
Prepare engineering section of Form FCC License to Cover Application	Yes
For Auxiliary Facility	No
For Main Facility	Yes
Prepare request for Special Temporary Authority	No
Quantity	N/A
Do you have Distributed Transmission System engineering services?	N/A
Critical Facility	N/A
Terrain-Shielded Facility	N/A
Prepare and file Form FCC Construction Permit Application	Yes
For Auxiliary Facility	No
For Main Facility	Yes
Prepare and file Form FCC License to Cover Application	Yes
For Auxiliary Facility	No
For Main Facility	Yes
Prepare request for Special Temporary Authority	No
Quantity	N/A
NEPA Section 106 environmental review	No
Environmental Assessment	No
ASR Modification	No
FAA Consultation (including preparation of FAA Form 7460)	No

Attorney and Other Outside Consulting Services

	Negotiation of Lease and other Matter for Shared Locations	No
	Prepare or Review FCC Form 399 for Reimbursement	Yes
	Address transition timing and coordination issues w/ other stations and wireless providers	Yes
RF Field Engineering Services	Comprehensive coverage verification via field study	No
	RF exposure measurements	No
	Additional Field Engineering Service	Yes
	Number of Days	13
	Justification	It will be necessary to survey the site, plan the equipment, develop specifications for purchasing, and oversee multiple vendor RF projects. Station does not have available personnel or personnel trained in such services.

Other Professional Services Expenses Not Listed

Outside Professional Services Costs

Name	Description
Other Legal Services	Other Legal Services related to the DTV Repack

Other Engineering Services

Fewer Project Management "PM" tasks are required & Other Engineering Services "OES" are required, therefore the PM total has been reduced to 20 hrs (\$3,000 at \$150 /hr), & a new OES category has been created & funded with the money removed from PM.

Other Expenses

Section	Question	Response
AM Pattern Disturbance	Is an Impact Study needed?	No
	Is Remediation needed?	No
Facility Expenses	Name	N/A
	Other Distributed Transmission System Expenses Not listed	N/A
	Name	N/A
	Is Notification of a Medical Facility required as a result of DTV broadcasting?	Yes
Permit and Filing Costs	Local Zoning	No
	Non-zoning permits	No
	BLM or NFS Coordination	No
	FCC Construction Permit Minor Change	No
	FCC License to Cover Application	No
	FCC Special Temporary Authority Application	No
Other Miscellaneous Expenses	Does this relocation require paying Disposal Costs (for equipment and other waste, net of any salvage value)?	Yes
	Does this relocation require Equipment Delivery or Handling Charges not otherwise included in individual item costs?	Yes
	Does this relocation require Equipment Storage?	Yes
	Does this relocation require the Development and Airing of an Announcement regarding an upcoming channel change?	Yes
	Does this relocation require MVPD Notification of a Channel Change?	Yes

Other Expenses Not Listed

Expenses Information not provided.

Cost Information

Transmitters

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Primary Transmitter TBD	\$393,211.81	\$384,461.81		\$86,371.35	
Electrical	\$115,161.81	\$115,161.81	See attached / uploaded PDF file titled "TSG TSG-MPB-2 v200511jgv1. pdf"	\$86,371.35	N/A
Standby Exciter and Switch	\$25,000.00	\$25,000.00	N/A	N/A	N/A
Additional Interior RF System	\$75,000.00	\$75,000.00	N/A	N/A	N/A
High VHF - Air Cooled Solid State Transmitter 1.1 . 4.4 kW	\$152,500.00	\$145,000.00	N/A	N/A	N/A
Transformer 3 phase /480v - 150 KVA	\$25,550.00	\$24,300.00	N/A	N/A	N/A
Sub-total	\$393,211.81	\$384,461.81	N/A	\$86,371.35	N/A
Total for all systems	\$624,072.77	\$579,530.77	N/A	\$167,742.71	N/A

Components

Actual Information	
Description	File Name

Electrical		
	Component Description:	TSG TSG-MPB-2 v200511jgv1
	Amount:	\$86,371.35
Standby Exciter and Switch	Information not provided.	
Additional Interior RF System	Information not provided.	
High VHF - Air Cooled Solid State Transmitter 1.1 . 4.4 kW	Information not provided.	
Transformer 3 phase/480v - 150 KVA	Information not provided.	

Cost Information

Antennas

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Primary Antenna TAB-12H	\$34,330.00	\$33,800.00		\$0.00	
Sweep test of existing antenna	\$6,730.00	\$6,400.00	N/A	N/A	N/A
Rigging	\$20,000.00	\$20,000.00	N/A	N/A	N/A
Elbow complex, single channel, at antenna input, per 3 1 /8. feedline (if needed)	\$7,600.00	\$7,400.00	N/A	N/A	N/A
Sub-total	\$34,330.00	\$33,800.00	N/A	\$0.00	N/A
Total for all systems	\$624,072.77	\$579,530.77	N/A	\$167,742.71	N/A

Components

Information not provided.

Cost Transmission Line

Information Information not provided.

Cost Tower Equipment and Rigging Costs

Information Information not provided.

Cost Information

Outside Professional Services

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Outside Professional Services	\$162,980.96	\$128,268.96		\$76,273.36	
Other Legal Services	\$10,000.00	\$10,000.00	N/A	\$1,655.50	N/A
Prepare engineering section of FCC Form 2100 (main), Construction Permit Application	\$3,155.00	\$3,000.00	N/A	\$2,000.00	N/A
Perform engineering study for new channel assignment and antenna development	\$7,360.00	\$2,750.00	N/A	\$2,750.00	N/A
Address transition timing and coordination issues w/ other stations and wireless	\$2,630.00	\$2,500.00	N/A	N/A	N/A

Prepare and or review reimbursement form	\$2,630.00	\$2,500.00	N/A	\$2,500.00	N/A
Project management of the transition	\$32,232.00	\$3,000.00	Fewer Project Management "PM" tasks are required & Other Engineering Services "OES" are required, therefore the PM total has been reduced to 20 hrs (\$3,000 at \$150/hr), & a new OES category has been created & funded with the money removed from PM.	\$3,000.00	N/A
Other Engineering Services	\$69,768.96	\$69,768.96	KGA-MPB Contract GS# 529- 004 + \$425 KGA invoice 139-312	\$59,912.68	N/A
Additional Field Engineering Service, 13 Days	\$26,000.00	\$26,000.00	N/A	\$4,405.68	N/A
Attorney Fees - Prepare and File FCC Form 2100 (main), License to Cover Application	\$2,365.00	\$2,250.00	N/A	N/A	N/A

Attorney Fees	የ ፫ ዕርዕ ዕር				
- Prepare and File FCC Form 2100 (main), Construction Permit Application	\$5,260.00	\$5,000.00	N/A	\$49.50	N/A
Prepare engineering section of FCC Form 2100 (main), License to Cover Application	\$1,580.00	\$1,500.00	N/A	N/A	N/A
Sub-total	\$162,980.96	\$128,268.96	N/A	\$76,273.36	N/A
Total for all systems	\$624,072.77	\$579,530.77	N/A	\$167,742.71	N/A

Components

Actual Information		
Description Description	File Name	
Other Legal Services		
	Component Description:	GMP 32518
		v200506jgv1
	Amount:	\$202.00
	Component Description:	GMP 31984
		v200219jgv1
	Amount:	\$140.00
	Component Description:	WMAE GSB inv
		#662020 DTV
		Repack legal
		services
		UL20180823jgv1
	Amount:	\$600.00

Component Description: GMP 31600

v191211jgv1

Amount: \$101.00

Component Description: GMP 31016

v190926jgv2

Amount: \$35.00

Component Description: WMAE GSB inv

#667584 DTV Repack legal services

UL20180823jgv1

Amount: \$150.00

Component Description: GMP 31400

v191113jgv1

Amount: \$85.50

Component Description: GSB 710996

v190605pmv1

Amount: \$46.50

Component Description: WMAE GSB inv

#670598 DTV Repack legal services

UL20180823jgv1

Amount: \$120.00

Component Description: WMAE GSB inv

#664826 DTV Repack legal services

UL20180823jgv1

Amount: \$90.00

Component Description: GSB 710370

v190605pmv1

Amount: \$46.50

Component Description: GSB 664826

v190516pmv1

Amount: \$90.00

Component Description: GMP 32344

v200408jgv1

Amount: \$39.00

Component Description: GSB 667584

v190516pmv1

Amount: \$150.00

Component Description: GSB 670598

v190516pmv1

Amount: \$120.00

Component Description: GSB 662020

v190515pmv1

Amount: \$600.00

Prepare engineering section of FCC Form 2100 (main), Construction Permit Application

Component Description: WMAE KGA inv

#139-283 CP App

UL20180809jgv1

Amount: \$2,000.00

Perform engineering study for new channel assignment and antenna development

Component Description: WN

WMAE KGA inv #139-283 New

channel assignment UL20180809jgv1

Amount: \$2,750.00

Component Description: Component Description: WMAE KGA inv #139-284 Prepare and or review 399 UL20180813jgv1 Amount: Component Description: KGA 139-333 v191011jgv1 Amount: Component Description: KGA 139-370 v200415jgv1 Amount: Component Description: KGA 139-300 v200128jgv1 Amount: Component Description: KGA 139-300 v200128jgv1 Amount: Component Description: KGA 139-303 v190703jgv1 Amount: Samount: Component Description: KGA 139-303 v190703jgv1 Amount: Samount: Component Description: WMAE KGA inv	Address transition timing and coordination issues w/ other stations and wireless	Information not provided.	
Amount: \$2,500.00 Project management of the transition Component Description: KGA 139-333 v191011jgv1 Amount: \$300.00 Component Description: KGA 139-370 v200415jgv1 Amount: \$300.00 Component Description: KGA 139-300 v200128jgv1 Amount: \$150.00 Component Description: KGA 139-303 v190703jgv1 Amount: \$300.00 Component Description: WMAE KGA inv #139-287 2017Q3 387 UL20180810jgv1 Amount: \$300.00 Component Description: KGA 139-377 v200430jgv1	Prepare and or review reimbursement form	Component Description:	#139-284 Prepare and or review 399
Component Description: KGA 139-333 v191011jgv1		Amount:	
Component Description: KGA 139-370 v200415jgv1		Component Description	VCA 420 222
Component Description: KGA 139-370 v200415jgv1		Component Description:	
Amount: \$300.00		Amount:	· -
Amount: \$300.00 Component Description: KGA 139-300 v200128jgv1 Amount: \$150.00 Component Description: KGA 139-303 v190703jgv1 Amount: \$300.00 Component Description: WMAE KGA inv #139-287 2017Q3 387 UL20180810jgv1 Amount: \$300.00		Component Description:	KGA 139-370
Amount: \$150.00 Component Description: KGA 139-303 v190703jgv1 Amount: \$300.00 Component Description: WMAE KGA inv #139-287 2017Q3 387 UL20180810jgv1 Amount: \$300.00 Component Description: KGA 139-377 v200430jgv1		Amount:	· -
Amount: \$150.00 Component Description: KGA 139-303 v190703jgv1 Amount: \$300.00 Component Description: WMAE KGA inv #139-287 2017Q3 387 UL20180810jgv1 Amount: \$300.00 Component Description: KGA 139-377 v200430jgv1			
Component Description: KGA 139-303 v190703jgv1 Amount: \$300.00 Component Description: WMAE KGA inv #139-287 2017Q3 387 UL20180810jgv1 Amount: \$300.00			v200128jgv1
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#139-287 2017Q3 387 UL20180810jgv1 Amount: \$300.00 Component Description: KGA 139-377 v200430jgv1		Amount:	· -
387 UL20180810jgv1 Amount: \$300.00 Component Description: KGA 139-377 v200430jgv1		Component Description:	WMAE KGA inv
Amount: \$300.00 Component Description: KGA 139-377 v200430jgv1			
v200430jgv1		Amount:	
· ·			VCA 420 277
		Component Description:	

Component Description: KGA 139-358

v200207jgv1

Amount: \$300.00

Component Description: KGA 193-303

v190716jgv1

Amount: \$300.00

Component Description: WMAE KGA inv

#139-290 2017Q4

387

UL20180809jgv1

Amount: \$150.00

Component Description: WMAE KGA inv

#139-296 2018Q1

387

UL20180810jgv1

\$150.00

Component Description: KGA 139-318

Amount:

v190715jgv1

Amount: \$300.00

Component Description: KGA 139-306

v190716jgv1

Amount: \$300.00

Other Engineering Services

Component Description: KGA 139-321

v190909jgv1 \$4,953.14

Amount: \$4,953.14

Component Description: KGA 139-309

v200128jgv1

Amount: \$50.00

Component Description: KGA 139-324

v190909jgv1

Amount: \$4,953.14

Component Description: KGA 139-364

v200320jgv1

Amount: \$4,953.14

Component Description: KGA 139-312

v190605pmv1

Amount: \$425.00

Component Description: KGA 139-338

v191112jgv1

Amount: \$4,953.14

Component Description: KGA 139-356

v200207jgv1

Amount: \$4,953.14

Component Description: KGA 139-342

v191211jgv2

Amount: \$4,953.14

Component Description: KGA 139-338

v191210jgv1

Amount: \$4,953.14

Component Description: KGA 139-327

v190909jgv1

Amount: \$4,953.14

Component Description: KGA 139-365

v200408jgv1

Amount: \$4,953.14

Component Description: KGA 139-379 v200506jgv1 Amount: \$4,953.14 **Component Description:** KGA 139-315 v190625jgv1 **Amount:** \$4,953.14 **Component Description:** KGA 139-331 v191009jgv1 **Amount:** \$4,953.14 **Component Description:** KGA 139-351 v200207jgv1 **Amount:** \$4,953.14 Additional Field Engineering Service, 13 **Component Description:** KGA inv #139-285 Days On site survey split evenly between WMAB WMAE WMAW UL20180814jgv1 Amount: \$4,405.68 Attorney Fees -Prepare Information not provided. and File FCC Form 2100 (main), License to Cover Application

Attorney Fees - Prepare and File FCC Form 2100 **Component Description:** GSB 662020 (main), Construction v190515pmv1 Permit Application \$49.50 Amount: **Component Description:** WMAE GSB inv #662020 DTV Repack legal services CP App UL20180823jgv1 **Amount:** \$49.50 Prepare engineering Information not provided. section of FCC Form 2100 (main), License to Cover Application

Cost Information

Other Expenses

Where no predetermined cost estimate is available, any estimate provided will also become the predetermined cost (displayed in italics).

Description	Predetermined Cost Estimate	Estimated Cost	Estimated Cost Justification	Actual Cost	Actual Cost Justification
Other Expenses	\$33,550.00	\$33,000.00		\$5,098.00	
Equipment Storage	\$5,000.00	\$5,000.00	N/A	N/A	N/A
Equipment Delivery and Handling Charges	\$10,000.00	\$10,000.00	N/A	N/A	N/A
Disposal Costs (for equipment and other waste, net of any salvage value)	\$5,000.00	\$5,000.00	N/A	N/A	N/A
DTV Medical Facility Notification	\$11,550.00	\$11,000.00	N/A	\$3,319.00	N/A
MVPD Notification of Channel Change	\$2,000.00	\$2,000.00	N/A	\$1,779.00	N/A
Develop and air announcement of upcoming channel change	\$0.00	\$0.00	N/A	N/A	N/A
Sub-total	\$33,550.00	\$33,000.00	N/A	\$5,098.00	N/A
Total for all systems	\$624,072.77	\$579,530.77	N/A	\$167,742.71	N/A

Components

Actual Information Description	File Name	
Equipment Storage	Information not provided.	
Equipment Delivery and Handling Charges	Information not provided.	
Disposal Costs (for equipment and other waste, net of any salvage value)	Information not provided.	
DTV Medical Facility Notification	Component Description: Amount:	KGA 139-373 v200420jgv1 \$3,319.00
MVPD Notification of Channel Change	Component Description: Amount:	KGA 139-372 v200420jgv1 \$1,779.00
Develop and air announcement of upcoming channel change	Information not provided.	

Cost Information

Grand Total

	Predetermined Cost Estimate	Estimated Cost	Actual Cost
Total for all systems	\$624,072.77	\$579,530.77	\$167,742.71

Reimbursem	entestion	Response
Status	The facility has ceased operating on its pre- auction channel.	No
	Construction of final facilities or all necessary modifications are complete.	No
	All receipts for reimbursement have been submitted no further costs are expected to be incurred. Note this will lock the Form 399 from further editing and begin close-out procedures with the Fund Administrator.	No

Attachments